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- (56)
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- (57) **ABSTRACT**

- Vacuum cleaners and methods of controlling a motor driven by a battery source in a vacuum cleaner. The vacuum cleaner has a motor, a battery source for providing power to the motor, a voltage measuring unit for measuring a voltage over the motor, and a current measuring unit for measuring a current flowing through the motor. Further, the vacuum cleaner comprises a control unit for controlling, based on the measured voltage and/or the measured current, the power provided to the motor from the battery source to attain a target motor power value during a specified time period running from start-up of the motor, and to gradually decrease the power provided to the motor after the time period ends.

- (58) **Field of Classification Search**
CPC H02P 29/0033
USPC 318/139, 34, 558
See application file for complete search history.

